

Utah Department of Health

Asthma Education Toolkit

for the doctor's office medical team

health.utah.gov/asthma



This toolkit is for physicians, nurses, quality improvement coordinators, and anyone interested in enhancing asthma education in the doctor's office.

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REFERENCES

¹Expert Panel Report 3: Guidelines for the Diagnosis and Management of Asthma, Clinical Practice Guidelines. National Asthma Education and Prevention Program of the National Heart, Lung, and Blood Institute, National Institutes of Health; (2007).

²Wilson S. R, Starr-Schneidkraut N. 1994. State of the Art in Asthma Education: The US Experience. *Chest*, 106 (4), supplement 197S-205.

³Fleming, S. O., (1998, Spring/Summer). Breathing Easier: The Growth and Development of an Asthma Research Initiative. Findings, p. 2-15.

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Asthma Education Toolkit for the Doctor's Office Medical Team

Asthma cannot be cured but it can be managed. Those with asthma should be able to do all the things they want to. It is important to help your patients develop the skills necessary to control asthma symptoms, understand the role of asthma medications, and manage asthma attacks and triggers.

"Organizations need to have a system where education is integrated into everything that goes on in the clinical setting. The minute a patient walks into the clinic the education must start and the message must continue to be reinforced through the treatment."³

This Toolkit will help you learn how to develop a system where asthma education can occur at every point of care and from every member of the medical team.

DETERMINE key educational messages

An important step in developing an asthma education strategy for the office is to determine from the clinicians what key education messages they want to focus on with each patient and for the practice.

The person who guides/leads asthma education with each patient is the principal clinician, care manager, or any other health professional trained in asthma management and self-management education for the patient.¹



Asthma Education

"The patient sees a clinician for, at most, half an hour. The rest of the time the patient is making decisions. Of course, the patient can exercise judgment only insofar as they get good teaching from their clinician."

Dr. Dean Noreen Clark

The principal clinician should¹:

- Identify key educational messages for the patient;
- Introduce these messages to the patient; and
- Discuss with the patient goals of treatment and medication and actions the patient will take to promote asthma control.

What are the messages that the principal clinician will want to focus on in the practice and for each patient?

Key educational messages recommended by the NHLBI: Teach and reinforce at every opportunity

Basic Facts about Asthma

- The contrast between airways of a person who has and a person who does not have asthma; the role of inflammation.
- What happens to the airways during an asthma attack.

Role of Medications: Understanding the Difference Between:

- Long-term control medications: prevent symptoms, often by reducing inflammation. Must be taken daily. Do not expect them to give quick relief.
- Quick-relief medications: SABAs relax airway muscles to provide prompt relief of symptoms. Do not expect them to provide long-term asthma control. Using SABA > 2 days a week indicates the need for starting or increasing long-term control medications.

Patient Skills

- Taking medications correctly
 - Inhaler technique (demonstrate to the patient and have the patient return the demonstration).
 - Use of devices as prescribed (e.g., valved holding chamber (VHC) or spacer, nebulizer).
- Identifying and avoiding environmental exposures that worsen the patient's asthma; e.g., allergens, irritants, tobacco smoke.
- Self-monitoring
 - Assess level of asthma control
 - Monitor symptoms and, if prescribed, peak flow measures.
 - Recognize early signs and symptoms of worsening asthma.
- Using a written asthma action plan to know when and how to:
 - Take daily actions to control asthma
 - Adjust medication in response to signs of worsening asthma
 - Seeking medical care as appropriate.



Monitor asthma control periodically in clinical visits. The frequency of and monitoring are a matter of clinical judgment. In general:

- Schedule visits at 2- to 6-week intervals for patients who are just starting therapy or who require a change in medications to achieve or regain asthma control.
- Schedule visits at 1- to 6-month intervals after asthma control is achieved to monitor whether asthma control is maintained. The interval will depend on factors like the duration of asthma control or the level of treatment required.

ASTHMA discussion with patient

After the key educational messages have been identified by the principal clinician, the patient should be included in the discussion.

Behavior change doesn't come from one thing alone; it comes from a partnership between physician and patient.³

Develop an active partnership with the patient and family by¹:

- Establishing open communication
- Identifying and addressing patient and family concerns about asthma and asthma treatment
- Identifying patient/parent/child preferences regarding treatment and barriers to its implementation
- Developing treatment goals together with patient and family and encouraging active self-assessment and self-management of asthma

Expert care with regular review by health professionals is necessary but not sufficient to improve outcomes.¹ Patients must take responsibility for their asthma. Effective management of asthma hinges on patients' understanding of asthma and their ability to prevent and manage symptoms.³

Talk to your patients

10 Questions to Ask Your Patient About Asthma.

- 1** | What worries you most about your asthma?
- 2** | What do you want to be able to do that you can't do now because of your asthma?
- 3** | Please show me how you use your inhaled medications?
- 4** | What problems have you had using your medications?
- 5** | What medications are you taking? How and when are you taking them?
- 6** | What medicines have you tried?
- 7** | Are there things in your environment that make your asthma worse?
- 8** | What do you want to accomplish at this visit?
- 9** | What do you expect from treatment?
- 10** | What other questions do you have for me today?



TALKING about asthma in the office

All health care professionals who encounter patients with asthma should reinforce the key educational messages during clinic visits.¹ One of the biggest challenges is to organize the office so that asthma education can take place.

Look for open discussion about education from the medical team. Those who work day to day with patients are sometimes the best source of ideas.

An example of office organization for group practices:

Allow one physician (or midlevel provider) and one medical assistant (MA) to assume the role as asthma lead.

As a team, they can be responsible for supervising the asthma processes in the office. For instance, one of the challenges is turnover of office staff. If one MA is the asthma lead, he or she can teach the new MAs.

Below are some talking points to help talk with the medical team:

Talk to your team

What does the medical team think about asthma education?

- How will asthma education involve all members of the health care team?
- What messages do your staff feel comfortable teaching? In what areas do they need more training or information?
- How can the medical team reinforce key education messages of the principal clinician?
- How will this affect their other day-to-day duties?

It is important to know what the physician's vision of asthma education is for the clinic and the patient so the medical team can then support the patient and the clinician.

Simple and small changes in the delivery of asthma education can make a big difference.



Ideas for implementing asthma education in the doctor's office

1 | Get the patient an asthma action plan. Self-management education that includes a written asthma action plan appeared more effective than other forms of self-management education.

2 | Create an asthma registry. Allows early identification of potential problems and enhances education. Provides better disease control and is another building block to achieving the goal of normal lives for patients with asthma.

3 | Do patients know the difference between controller and quick relief medications? Put red tape on the quick relief medication so it is clear which medication patients need to take when they can't breathe and which one they take every day.

4 | Remind patients to bring medications at each visit and have patient demonstrate how to use the inhaler at every visit. Skills such as inhaler technique are best improved when there is individual feedback and coaching.

5 | Train medical team on proper inhaler technique so they can reinforce it with patients. Contact a respiratory therapist or other specialist to teach the medical team correct inhaler technique so that it can be properly taught to patients.

6 | Encourage patients to ask their pharmacist to show them the correct inhaler technique. Pharmacists can be a great resource for patients when it comes to medications.

7 | Provide spacers in the office. One can bill insurance for these, and most will reimburse. Otherwise, the patient goes to the pharmacy, may have to pay out of pocket and thus may choose not to get a spacer.

8 | Identify asthma triggers. Avoiding and eliminating triggers helps patients to better control symptoms. See insert.

9 | Check out the outdoor air quality at: <http://www.airquality.utah.gov/>
Many people experience respiratory problems when the air quality is poor. Learning how the air quality is reported and monitored can help patients know when they need to take action to prevent symptoms.

10 | Set aside time for asthma follow-up visits. Allow 20-30 minutes for these visits.

11 | Have an asthma learning day at the clinic for patients. A wide variety of educational formats have been used to provide asthma education to patients. Small group format has shown to be effective in asthma education as well as cost-effective.

12 | Utilize community resources and education.
<http://www.health.utah.gov/asthma/community/resources.html>

*These are just some possible ideas and suggestions. There are many asthma education techniques. Find those that work best in your practice.

PUTTING IT ALL TOGETHER

Now that you have gathered all of your information, it is time to get it down on paper, in the patient's chart, and let everyone know what their responsibilities are in the asthma education plan.

Below are the final steps for implementation of the asthma education plan:

1. Compile resources, and gather information from the physician and patients.
2. Develop an asthma education plan for office and patients.
3. Write it down!
4. Ensure that the medical team and patient are aware of the plan.
5. Review and adjust the plan as needed.



Let us know how it went

What worked for your office?
Did you learn something new?
Did you have questions?
Was this toolkit helpful to you?
We would love to hear your stories.



We want to make this toolkit useful for practices and clinics, so your comments will be greatly appreciated.

Visit www.health.utah.gov/asthma to submit your story.

HANDOUTS FOR PATIENT EDUCATION

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Asthma Action Plan

For additional educational materials visit the Asthma Program Web Site at:
http://www.health.utah.gov/asthma/professionals/resource_guide.html

RESOURCES

Below are some additional resources available that provide information about asthma education strategies:

- National Heart, Lung, and Blood Institute
<http://www.nhlbi.nih.gov/guidelines/asthma/index.htm>
- Centers for Disease Control and Prevention
<http://www.cdc.gov/health/asthma.htm>
- Chronic Care Model
<http://www.improvingchroniccare.org>
- Talk with other clinics, physicians, and asthma specialists to find out what has worked for them.



Metered-Dose Inhaler

Metered-dose inhalers (inhalers or puffers) are used to treat asthma symptoms by delivering an exact amount of sprayed aerosolized medicine. When used properly, inhalers are a safe, convenient, and effective treatment option.

Most inhalers consist of a small metal can filled with a propellant drug solution that sits inside a plastic holder. Each can holds a different amount of medication and it is important to check the package insert and track the number of times the inhaler has been used.



Spacers:

Use with each dose. Without a spacer, most medication hits the back of the throat and does not go down into the lungs. A spacer is a chamber that keeps the medicine contained before it is breathed in to help more medicine reach the lungs.

Using an inhaler with a spacer:

1. Shake the inhaler well before use (3 or 4 shakes).
2. Remove the cap and attach inhaler to spacer.
3. Breathe out, away from the mouthpiece.
4. Bring the mouthpiece to your mouth, and place between teeth, closing the mouth around it.
5. Start to breathe in, slowly. Press the top of the inhaler once and keep breathing in slowly for a full breath. Remove the mouthpiece from mouth and hold breath for 10 seconds, then breathe out.
6. If a second dose is needed, wait 1-2 minutes and repeat the process.

Using an inhaler without a spacer:

1. Take the cap off and shake well before use.
2. Breathe out all the way.
3. Hold the inhaler 1 to 2 inches in front of your mouth (about the width of two fingers).
4. Start breathing in slowly through your mouth, and then press down on the inhaler one time. Breathe in slowly, and as deeply as you can.
5. Slowly count to 10 while you hold your breath (if you can).
6. If a second dose is needed, wait 1-2 minutes and repeat the process.
7. Rinse your mouth afterward to help reduce unwanted side effects.

Cleaning the inhaler and spacer:

1. Remove the metal can from the plastic container.
2. Soak the plastic in warm, soapy water for 15 minutes.
3. Rinse carefully.
4. Shake off extra water. Do not rub dry.
5. Air dry upside down on a clean towel.

Note: Some inhalers come in a powder form. Consult the package insert for use and care.

Helpful Tips for Controlling Triggers at Home

1 | Take it outside. One of the most common asthma triggers in the home is secondhand smoke. Until you can quit, smoke outside, not in your home or car.

Utah Tobacco Quit Line 1.888.567.TRUTH (8788)

Utah QuitNet: utahquitnet.com

2 | Good night, little mite! Dust mites are also triggers for asthma. For mite control, cover mattresses and pillows with dust-proof (allergen impermeable) zipped covers. Wash sheets and blankets once a week in hot water.

3 | A little goes a long way. Reduce everyday dust buildup by regularly dusting with a damp cloth and vacuuming carpet and fabric-covered furniture.

4 | Stake your claim. Household pets can trigger asthma with skin flakes, urine, and saliva. Keep pets outdoors if possible.

5 | Uninvite unwelcome guests. Cockroaches can trigger asthma. Don't invite them into your home by leaving food or garbage out. Always clean up messes and spills and store food in airtight containers.

6 | Think before you spray. Instead of pesticide sprays, control pests by using baits or traps. If sprays are necessary, always circulate fresh air into the room being treated and keep asthma sufferers out of that room for several hours after any spraying.

7 | Break the mold. Mold is another asthma trigger. The key to controlling mold is controlling moisture. Wash and dry hard surfaces to prevent and remove mold. Replace moldy ceiling tiles and carpet.

8 | Air it out. Reducing moisture will control asthma triggers like mold, cockroaches, and dust mites. Use exhaust fans or open windows when cooking and showering. Fix leaky plumbing and other unwanted sources of water.

9 | Post a note. Post an asthma action plan on the refrigerator to help control asthma triggers and reduce asthma attacks in your home and share it with others.

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Helpful Tips for Controlling Triggers Outside

1 | Identify triggers Understanding asthma triggers is an essential part of asthma management. In fact, identifying your personal triggers is the first step in gaining asthma control. Try to find the specific triggers or causes of your asthma, and then plan to avoid these triggers and have better asthma control. If exposure isn't controlled, triggers can cause severe flare-ups, chronic symptoms between flare-ups, and even reduced lung function.

2 | Count the Pollen. Pollen is a common trigger of asthma. Pollen can trigger asthma symptoms such as wheeze, cough, chest tightness, and difficulty breathing. Check the pollen count for Utah at: <http://www.intermountainallergy.com/pollen.html>

3 | Check air quality. Air pollution can make asthma symptoms worse and trigger attacks. Get to know how sensitive you are to air pollution. Notice your asthma symptoms when you are physically active. Do they happen more often when the air pollution is bad? Also, notice any asthma symptoms that begin up to a day after you have been outdoors in polluted air. Air pollution can make you more sensitive to asthma triggers like mold and dust mites. If you are more sensitive than usual to indoor asthma triggers, it could be due to air pollution outdoors. Utah's air quality is available at: <http://www.airquality.utah.gov/>

4 | Exercising with asthma. Make a habit of warming up and cooling down for at least 15 minutes before and after exercise. Avoid exercising outdoors in extremely cold temperatures, when pollen levels are high, or when air quality is poor. Using a short-acting bronchodilator 15 minutes before exercise might also help prevent symptoms. Keep your medication with you when you are exercising.

5 | Cold weather action. Cold air entering the lungs can cause airway constriction and is therefore a common trigger. To help manage asthma in cold weather, consider these following tips:

- Keep your asthma well controlled at all times and carry your prescribed reliever medication with you.
- If cold air is a trigger for you, take your reliever medication 10–15 minutes before exposure to cold air. Avoid outdoor exercise in extremely cold weather.
- A scarf that covers both your nose and mouth will help keep the air you breathe warm and moist.

6 | Get a flu shot. Respiratory infections like the flu are more serious in patients with asthma, and such infections can often lead to pneumonia and acute respiratory disease.

7 | Choose smoke-free venues. People with asthma have sensitive airways. Smoke is a powerful trigger, and can bring on an asthma attack even outdoors.

8 | Do your part to improve air quality. There are many things we can do collectively to help improve both indoor and outdoor air quality. Check out this Web Site to find out what you can do: <http://www.cleanair.utah.gov/>

Date _____ Patient name _____ DOB _____
MD _____ MRN _____ ☐ Reviewed with: guardian/patient Verbalized understanding ☐ yes ☐ no

Asthma ACTION PLAN

- ☐ Breathing is easy
- ☐ No coughing
- ☐ No wheezing
- ☐ No shortness of breath
- ☐ Can work, play, and sleep easily
- ☐ Using quick-relief medication less than twice a week
- ☐ **PEAK FLOW**
80%–100% of personal best

go
maintain therapy

Avoid these asthma triggers: _____

Take **CONTROLLER** medication: _____

Take **QUICK-RELIEF** medication:

☐ Before exercise: _____

☐ Before exposure to a trigger: _____

Keep **ORAL STEROIDS** on hand in case you fall into **STEP 3** of the yellow zone or into the red zone.

- ☐ Using quick-relief medication more than twice a week*
- ☐ Coughing
- ☐ Wheezing
- ☐ Shortness of breath
- ☐ Difficulty with physical activity
- ☐ Waking at night
- ☐ Tightness in chest
- ☐ **PEAK FLOW**
50%–80% of personal best

caution
step up therapy

STEP 1: Add QUICK-RELIEF medication:

STEP 2: Monitor your symptoms:

- If symptoms **GO AWAY** quickly, return to the green zone.
- If symptoms **CONTINUE** or return within a few hours:

☐ Add _____

STEP 3: Continue monitoring your symptoms:

- If symptoms **CONTINUE** after step 2 treatment:

☐ Add _____

oral steroid medication

☐ Call your healthcare provider: _____

*You might need a change in your treatment plan

- ☐ Medication is not helping
- ☐ Breathing is very difficult
- ☐ Cannot walk or play
- ☐ Cannot talk easily
- ☐ **PEAK FLOW**
Less than 50% of personal best

stop
get help now

☐ **Call your healthcare provider:** _____

If you can't reach your healthcare provider quickly, go to the nearest hospital emergency room or call 911 immediately.

☐ **Go to the hospital emergency room or call 911 immediately.**

- If you have an oral steroid at home, take _____ mg of _____ as you leave for the hospital.

- Continue to use your quick-relief medication _____ as you go to the emergency room.

Asthma symptoms can get worse quickly. When in doubt, seek medical help.



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